OPERATING INSTRUCTIONS

Digital LCD Colour Monitor

Please read this manual thoroughly before operating the unit, and keep it for future reference.
V1.1

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1. PRECAUTIONS

Storage and Keeping

1. Do not expose the monitor to excessive heat or cold. The storage temperature of this device is -30~+80., and the operating temperature is -20~+70 .. The humidity is Rh90%.
2. Never use this device near a bathtub, wash basin, kitchen, damp basement, swimming pool or similar places.
3. Never use this device in environments with excessive moisture, dust or smoke.
4. Avoid dropping or striking this device.
5. Avoid using this device in enclosed spaces, areas with excessive vibration or subject to severe impacts.
6. Never puncture, scratch or use abrasive cleaning materials on this device..
7. Do not place cables where they may be pinched or stepped on.
8. Leave at least a 2" space between the monitor and walls, cabinets or other objects to allow adequate air circulation around the unit.
9. The monitor is not designed to be waterproof.

Operating Precautions

1. The device may be powered by a 12 or 24 volt automotive battery or vehicle electrical system

2. Make sure all cables are connected properly.Observe polarity. Improper cable connections may damage the monitor. Remove the power cable connections when you do not intend to use the unit.

⚠ WARNING!

1. High voltage is present within the monitor. The opening of the case should be by professionals.
2. Do not watch the video while driving unless you are monitoring the rear view camera display.

⚠ SPECIAL NOTICE

Occasionally, a few highlights or dark spots may occur on the LCD screen. This is a very common phenomenon in active matrix display technology, and doesn't necessarily indicate any defects or faults. Never try to repair this device by yourself. In case of any problems, please turn off the display at once and notify our company or authorised dealer. The monitor is a complex device. Any disassembly or modification may lead to damage and void the warranty.

Maintenance

1. Remove all the cable connections from the monitor before cleaning the unit.
2. Use a mild household detergent and clean the unit with a slightly damp, soft cloth. Never use strong solvents such as thinner or benzine, as they might damage the finish of the device.

CAUTION
RISK OF ELECTRIC SHOCK
DO NOT OPEN
CAUTION: TO REDUCE THE RISK OF ELECTRIC SHOCK,
DO NOT REMOVE COVER (OR BACK).
NO USER-SERVICEABLE PARTS INSIDE.
REFER SERVICING TO QUALIFIED SERVICE PERSONNEL.

This symbol is intended to alert the user to the presence of uninsulated "dangerous voltage" within the product's enclosure that may be of sufficient magnitude to constitute risk of electric shock to persons.

This symbol is intended to alert the user to the presence of important operating and maintenance (servicing) instructions in the literature accompanying the appliance.

This symbol is intended to alert the user not to waste electrical and electronic equipment.

CAUTION
You are cautioned that any changes or modifications not expressly approved in this manual could void your warrantee and necessitate expensive repairs.

Declaration of conformity

This device complies with Part 15 of the FCC Rules. Operation is subject to the following two conditions:

(1) This device may not cause harmful interference.

(2) This device must accept any Interference received, including interference that may cause undesired operation.

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2. PRODUCT FEATURES

1. Wide viewing angle and high resolution.
2. Multi-languages of display: English, French, Portuguese, Spanish, Russian, Dutch, German, Italian.
3. Multiple video formats: PAL/AUTO/NTSC.
4. 1 camera input, 1 reversing trigger wire.
5. Power supply to camera.
6. Operates from 12~32V. Supports 12V or 24V.
7. Image adjustable for Horizontal, Vertical, Mirror and Normal viewing.
8. On-board speaker.
9. Full-function remote control.

3. TECHNICAL SPECIFICATIONS

1. 7" TFT- LCD Colour monitor with digital panel.
2. Audio output: 1W.
3. Loudspeaker: one 15x24mm round loudspeaker.
4. Power supply: Automobile storage battery (12-32V).
5. Power consumption: about 6W .
6. Outer dimension:
   182mm (W) × 122mm (H) × 26mm (T) (without flush mount)
   198mm (W) × 138mm (H) × 31mm (T) (with flush mount).
7. Dot pitch: 0.192 (H) × 0.1805 (V).
8. Resolution: 800×3 (RGB) × 480.
9. Contrast: 500:1.
10. Brightness: 400cd/m.2
11. Viewing angle: U: 50° / D: 60°, R/L: 70°/ 70°.
12. Operating temperature: -20~+70°C,RH90%.
13. Storage temperature: -30~+80°C, RH90%.

! SPECIAL NOTICE

All specifications are subject to change without notice.

4. ACCESSORIES

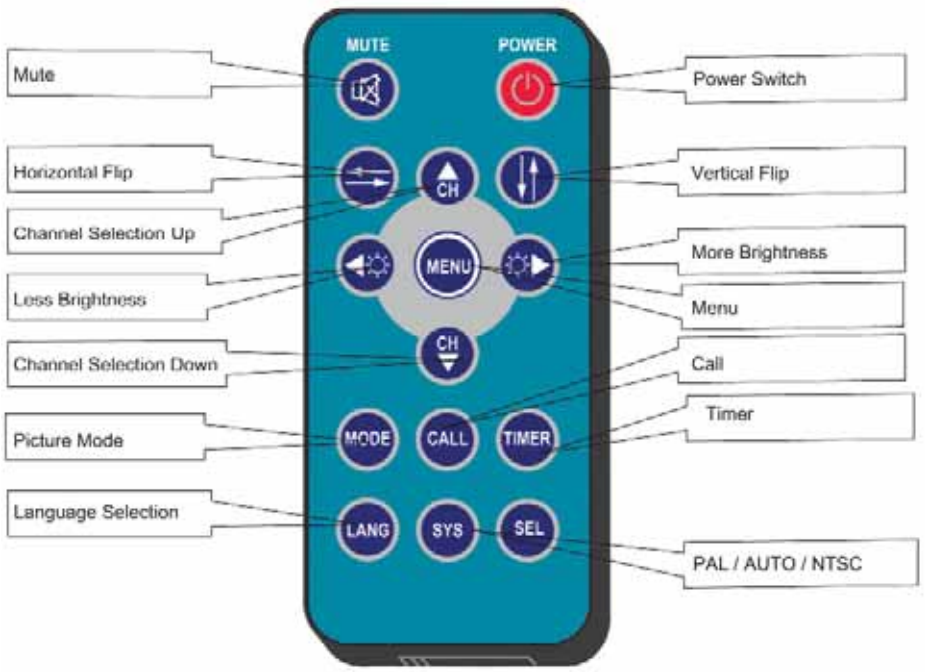
U- Support Bracket	Center Mount Bracket
AV and Power supply adapter cable	IR Remote control
Sun Shield	Detaching Piece(optional)
Angle Adjustment screws	Flush Mount(optional)

⚠ SPECIAL NOTICE

Accessory supply may be different for different application.

5. PARTS IDENTIFICATION

6. REMOTE CONTROL OPERATION



NOTICE

1. Please align the remote control with the infrared-receiving window on the monitor to operate.
2. Never disassemble the remote control or allow it to drop, or become wet.
3. Press the control buttons firmly. Allow 2 seconds for the picture to change.

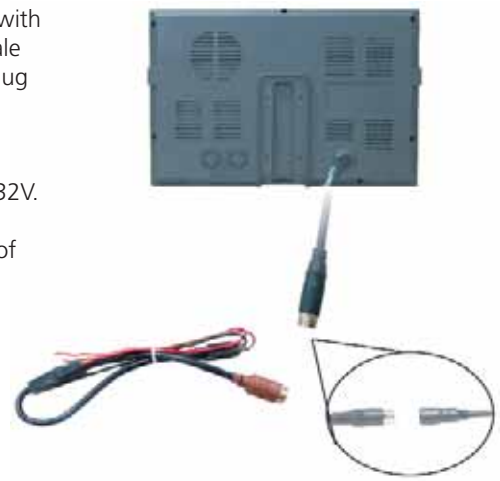
- **MUTE (Mute):**
  Press to select ENABLE/MUTE sound.
- **POWER (Power Switch):**
  Press to turn on/off the monitor.
- **(Horizontal Turning of Picture):**
  Press to turn picture horizontally.
- **(Vertical Turning of Picture):**
  Press to turn picture vertically.
- **CH+ (Channel Selection+):**
  Press to select channel/item on menu.
- **CH- (Channel Selection-):**
  Press to select channel/item on menu.
- ◁☼
  Press to decrease Brightness.
- ☼▷
  Press to increase Brightness.
- **MENU :**
  Press to show menu.
- **MODE (Picture Mode):**
  Press to select different picture modes
  (PERSONAL / STANDARD / SOFT / VIVID / LIGHT).
- **CALL (Call):**
  Press to close menu.
- **TIMER:**
  Press to set the timer to shut down the monitor
  (10,20,30,40 and max 90 minutes).
- **LANG (Language Selection):**
  Press to select language display of ENGLISH, FRENCH, PORTUGUESE, SPANISH, RUSSIAN, GERMAN, ITALIAN or DUTCH options .
- **SYS:**
  Press to select PAL / AUTO / NTSC.

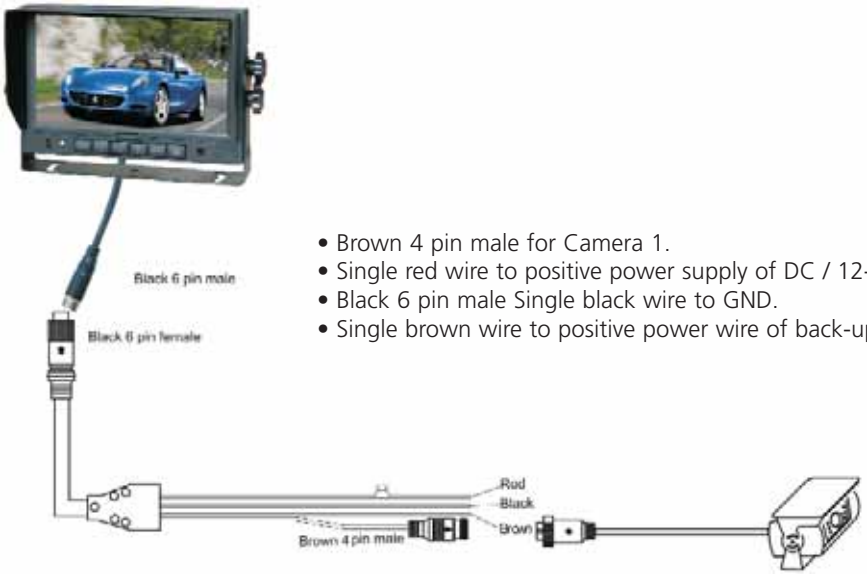
7. BASIC OPERATION

7.1. Connection of AV Adaptor and Controller Cable

Hold the cable, align the side of jack marked with ⇨ on the female 6-pin connector with the male 6-pin connector marked with ⇦ then firmly plug together.

1. Brown 4 pin male for Camera1.
2. Single red wire to power wire of DC / 12-32V.
3. Single black wire to GND.
4. Single brown wire to positive power wire of the back-up light.



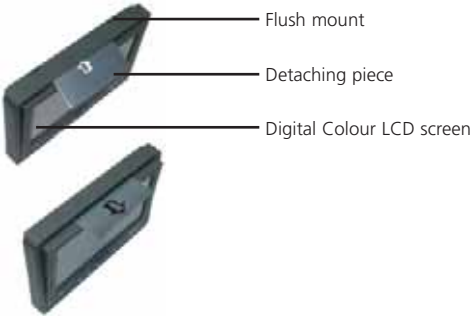


- Brown 4 pin male for Camera 1.
- Single red wire to positive power supply of DC / 12-32V.
- Black 6 pin male Single black wire to GND.
- Single brown wire to positive power wire of back-up light .

7.3 Removing the Monitor:

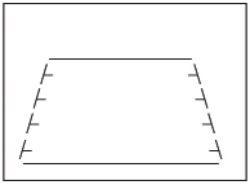
7.3.1. Insert the detaching piece as indicated by the white arrow. Press in and lift up, the monitor will be released from the flush mount.

7.3.2. Remove the monitor.



7.4 Reversing Display:

7.4.1. When the brown wire is connected to the positive wire of back-up light, the monitor automatically switches to CAM 1 (back-up camera) when the back-up light is turned on. The distancing grid will also be displayed.



8. MENU

Press MENU to display the following options and settings:

1. PICTURE
2. OPTION
3. SYSTEM

(1) Picture
BRIGHT,CONTRAST, COLOR, VOLUME options will display on the screen as illustrated below:

Press CH-to select BRIGHT.

PICTURE	
BRIGHT	50
CONTRAST	50
COLOR	50
VOLUME	50
IIIIIIIIIIIIIIIIIIIIII.....	50

Press △☼ /▽☼ to adjust the brightness level.

Press CH-to select CONTRAST.

PICTURE	
BRIGHT	50
CONTRAST	50
COLOR	50
VOLUME	50
IIIIIIIIIIIIIIIIIIIIII.....	50

Press △☼ /▽☼ to adjust the contrast level.

(2) OPTION

LANG , SCALE , CAM1 , options display on the screen as illustrated below:

Press CH- to select LANG.

OPTION	
LANG	ENGLISH
SCALE	ON
CAM1	NORMAL

Press △☼ /▽☼ to select ENGLISH / FRENCH / PORTUGUESE / SPANISH / RUSSIAN / GERMAN / ITALIAN / DUTCH.

Press CH- to select SCALE.

OPTION	
LANG	ENGLISH
SCALE	ON
CAM1	NORMAL

Press △☼ /▽☼ to select ON / OFF. Scale refers to the reversing distance indicator displayed on the monitor.

Press CH- to select CAM1.

OPTION	
LANG	ENGLISH
SCALE	ON
CAM1	NORMAL

Press △☼ /▽☼ to select NORMAL / MIRROR.

(3) SYSTEM

COLOR-SYS, BLUE BACK, HORIZONTAL, VERTICAL, ZOOM functions will display on the screen as illustrated below:

Press CH- to select COLOR-SYS.

SYSTEM	
COLOR-SYS	AUTO
BLUE BLACK	ON
HORIZONTAL	⇄
VERTICAL	↑↓
ZOOM	16:9

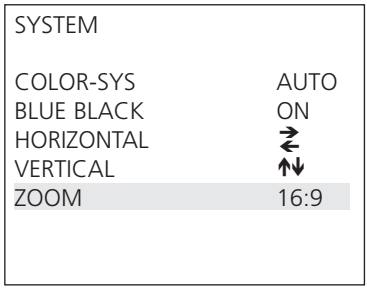
Press △☼ /▽☼ to select PAL / AUTO / NTSC.

Press CH- to select BLUE BACK.

SYSTEM	
COLOR-SYS	AUTO
BLUE BLACK	ON
HORIZONTAL	⇄
VERTICAL	↑↓
ZOOM	16:9

Press △☼ /▽☼ to select ON / OFF

Press CH- to select ZOOM.



Press △☼ /▽☼ to select 16:9 or 4:3

9. TROUBLESHOOTING

The symptoms described below do not necessarily mean a failure within the display.Please check the following items before you initiate request for repair.

SYMPTOM	POSSIBLE CAUSES/SOLUTIONS
No picture, no sound	Improper connection of automobile adaptor. Use of un-authorised power supply. Power switch is on OFF position.
No picture	Check whether AV cable is properly connected.
No sound	Check whether audio wire is properly connected or the sound volume is turned off or set too low.
Dark picture	Check whether brightness and contrast are adjusted correctly; Check whether the environments temperature is too low.
No color	Adjust the color settings.
Upside down or lateral inverted picture	Use the remote control horizontal /vertical selection switch to set proper orientation.
No reversing function (i.e. Picture)	The black wire of the monitor AV cable to the reversing light may be loose. The red wire from the monitor may be loose.